UNITED STATES PATENT AND TRADEMARK OFFICE

UNITED STATES DEPARTMENT OF COMMERCE
United States Patent and Trademark Office
Address: COMMISSIONER FOR PATENTS
P.O. Box 1450
Alexandria, Virginia 22313-1450
www.uspto.gov

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
09/773,393	01/31/2001	Gregory Warren Goodknight	2705-155	4235

20575 7590 12/28/2005

MARGER JOHNSON & MCCOLLOM, P.C.
210 SW MORRISON STREET, SUITE 400
PORTLAND, OR 97204

EXAMINER	
MILLS, DONALD L	

ART UNIT	PAPER NUMBER
2662	

DATE MAILED: 12/28/2005

Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary	Application No.	Applicant(s)
	09/773,393	GOODKNIGHT, GREGORY WARREN
	Examiner	Art Unit
	Donald L. Mills	2662

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

1)☒ Responsive to communication(s) filed on *12 October 2005*.

2a)☒ This action is **FINAL**. 2b)☐ This action is non-final.

3)☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

4)☒ Claim(s) *1-21* is/are pending in the application.

4a) Of the above claim(s) _____ is/are withdrawn from consideration.

5)☐ Claim(s) _____ is/are allowed.

6)☒ Claim(s) *1-21* is/are rejected.

7)☐ Claim(s) _____ is/are objected to.

8)☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

9)☐ The specification is objected to by the Examiner.

10)☐ The drawing(s) filed on _____ is/are: a)☐ accepted or b)☐ objected to by the Examiner.

Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).

Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).

11)☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

12)☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).

a)☐ All b)☐ Some * c)☐ None of:

1.☐ Certified copies of the priority documents have been received.

2.☐ Certified copies of the priority documents have been received in Application No. _____.

3.☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

1) ☐ Notice of References Cited (PTO-892)
2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
3) ☒ Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08) Paper No(s)/Mail Date *11/07/2005*.
4) ☐ Interview Summary (PTO-413) Paper No(s)/Mail Date. _____.
5) ☐ Notice of Informal Patent Application (PTO-152)
6) ☐ Other: _____.

DETAILED ACTION

Claim Rejections - 35 USC § 102

1. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

> A person shall be entitled to a patent unless –
>
> (e) the invention was described in (1) an application for patent, published under section 122(b), by another filed in the United States before the invention by the applicant for patent or (2) a patent granted on an application for patent by another filed in the United States before the invention by the applicant for patent, except that an international application filed under the treaty defined in section 351(a) shall have the effects for purposes of this subsection of an application filed in the United States only if the international application designated the United States and was published under Article 21(2) of such treaty in the English language.

2. Claims 1-6 and 9-11 are rejected under 35 U.S.C. 102(e) as being anticipated by Thornton et al. (US 6,363,065 B1), hereinafter referred to as Thornton.

Regarding claims 1 and 11, Thornton discloses a voice-over-IP gateway, which comprises:

A converter operable to receive a packet data stream and to convert the packet data stream to a public switched telephone network data stream (Referring to Figure 1, the gateway will route the received packets through the PSTN or over the data network, converting the packets for transmission over the circuit switched network when the gateway determines that an auto-switch between the networks is necessary. See column 39, lines 63-67.)

A controller operable to (Referring to Figure 2, the gateway utilizes microcontroller **240**,)*:*

Send signals through the converter in the public switched telephone network data stream identifying the network device as a packet device (Referring to Figure 1, packets

are transmitted over the PSTN after the originating IP based device has its destination IP address translated by the gateway. See column 11, lines 1-4.)

Receive signals indicating at least one other network devices are participating in a public switched transmission session with the network device (Referring to Figure 1, the IP destination device receives the call initiation via the gateway. See column 11, lines 1-4.)

Send the packet data stream across the public switched transmission network to the at least one other network device without using the converter (Referring to Figure 1, voice data is exchanged by the originating and destination IP devices over the PSTN without conversion. See column 11, lines 1-4.)

Regarding claim 2, Thornton discloses *the network device as a voice gateway* (Referring to Figure 1, the gateway will route the packets through the PSTN. See column 11, lines 1-4.)

Regarding claim 3, Thornton discloses *the packet data stream further comprising coded voice* (Referring to Figure 1, the packets are encoded voice traffic. See column 10, line 63.)

Regarding claim 4, Thornton discloses *the packet data stream further comprising data* (Referring to Figure 1, the packets are encoded voice traffic. See column 10, line 63.)

Regarding claim 5, Thornton discloses *the converter further comprising a voice coder/decoder* (Referring to Figures 1 and 2, the gateway utilizes a DSP to covert compressed telephony signals. See column 14, lines 22-25.)

Regarding claim 6, Thornton discloses *the converter further comprising a modem* (Referring to Figures 1 and 2, the gateway inherently acts as a modem by transmitting digital data signals over the analog PSTN.)

Regarding claim 9, Thornton discloses *the controller is a processor configured to execute all the control operations* (Referring to Figure 1, the gateway will route the packets through the PSTN, inherently responsible for executing the call-setup and brake-down. See column 11, lines 1-4.)

Regarding claim 10, Thornton discloses *the controller further comprising more than one integrated circuit* (Referring to Figure 2, the gateway utilizes eight separate DSPs **225_1, ..., 225_8**. See column 14, lines 9-10.)

3. Claims 12, 13, 15, 16, 19, 20, and 21 are rejected under 35 U.S.C. 102(e) as being anticipated by Brent et al. (US 6,272,358 B1), hereinafter referred to as Brent.

Regarding claims 12 and 21, Brent discloses a vocoder by-pass for digital mobile-to-mobile calls, which comprises:

Establishing a communication session between a first packet device and other devices across a public switched telephone network by transmission of a public switched telephone network data stream through a public switched telephone network converter (Referring to Figure 2, a mobile-to-mobile call connection is established across the public switched telephone network via the public switched data stream. See column 2, lines 19-33.)

Using transmission of identifying signals to identify at least one other network device participating in the communication session as a packet device (Referring to Figure 2, a mobile-to-mobile call connection is established, requiring the identification of the called mobile (packet device) participating in the communication in order to establish mobile-to-mobile communication. See column 2, lines 19-33.)

Altering the communication session between the first packet device and the at least on other network device to transmit a packet data stream on the public switched telephone network eliminating use of any public switched telephone network converter prior to call establishment (Referring to Figure 2, the frame selector alters the communication session between the mobiles via a by-pass function of PCM conversion to transmit the frame over the high-speed data network prior to data transmission (call establishment). See column 2, lines 59-64.)

Regarding claim 13, Brent discloses *dialing out of a packet domain to a public switched telephone network domain* (Referring to Figure 2, calls are switched from the packet switch to the PSTN. See column 2, lines 27-32.)

Regarding claim 15, Brent discloses *eliminating a conversion through a voice coder/decoder* (Referring to Figure 2, the frame selector alters the communication session between the mobiles via a by-pass function of PCM conversion to transmit the frame over the high-speed data network. See column 2, lines 59-64.)

Regarding claim 16, Brent discloses *eliminating a conversion through a modem* (Referring to Figure 2, the frame selector alters the communication session between the mobiles via a by-pass function of PCM conversion to transmit the frame over the high-speed data network. See column 2, lines 59-64.)

Regarding claim 19, Brent discloses *wherein using transmission of identifying signals further comprises the first network device sending the identifying signals* (Referring to Figure 2, for mobile-to-mobile communications to occur the source mobile must identify itself to the destination mobile.)

Regarding claim 20, Brent discloses *wherein using transmission of identifying signals further comprises the first network device receiving and responding to identifying signals sent by another network device* (Referring to Figure 2, for mobile-to-mobile communications to occur the source mobile must exchange identity information between itself and the destination mobile.)

Claim Rejections - 35 USC § 103

4. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

> (a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negatived by the manner in which the invention was made.

5. Claim 7 is rejected under 35 U.S.C. 103(a) as being unpatentable over Thornton et al. (US 6,363,065 B1), hereinafter referred to as Thornton, in view of Sebestyen (US 5,847,752).

Regarding claim 7 as explained above in the rejection statement of claim 1, Thornton discloses all of the claim limitations of claim 1 (parent claim).

Thornton does not disclose *the controller utilizing ITU V.8 protocols.*

Sebestyen teaches a method for call setup and control of video-telephone communication utilizing the ITU-T V.8 signaling protocol (See column 10, lines 19-24.)

It would have been obvious to one of ordinary skill in the art at the time the invention was made to implement the video-telephone communication utilizing ITU-T V.8 signaling protocol of Sebestyen in the system of Thornton. One of ordinary skill in the art would have been motivated to do so in order to connect via analog or digital interfaces and maintain sufficient quality of service for the transmission of the signal.

6. Claim 8 is rejected under 35 U.S.C. 103(a) as being unpatentable over Thornton et al. (US 6,363,065 B1), hereinafter referred to as Thornton.

Regarding claim 8 as explained above in the rejection statement of claim 1, Thornton discloses all of the claim limitations of claim 1 (parent claim).

Thornton does not disclose *the controller using robbed-bit signaling.*

Thornton teaches a voice-over-IP telephony gateway which utilizes call independent signaling over conventional H.323 messages.

It would have been obvious choice in design to one of ordinary skill in the art at the time the invention was made to implement robbed-bit signaling in the system of Thornton. One of ordinary skill in the art would have been motivated to do so in order to efficiently utilize the transmission bandwidth for signaling, voice band, and digital data traffic.

7. Claim 14 is rejected under 35 U.S.C. 103(a) as being unpatentable over Brent et al. (US 6,272,358 B1), hereinafter referred to as Brent, in view of Sebestyen (US 5,847,752).

Regarding claim 7 as explained above in the rejection statement of claim 12, Brent discloses all of the claim limitations of claim 12 (parent claim).

Brent does not disclose *the controller utilizing ITU V.8 protocols.*

Sebestyen teaches a method for call setup and control of video-telephone communication utilizing the ITU-T V.8 signaling protocol (See column 10, lines 19-24.)

It would have been obvious to one of ordinary skill in the art at the time the invention was made to implement the video-telephone communication utilizing ITU-T V.8 signaling

protocol of Sebestyen in the system of Brent. One of ordinary skill in the art would have been motivated to do so in order to connect via analog or digital interfaces and maintain sufficient quality of service for the transmission of the signal.

8. Claims 17 and 18 are rejected under 35 U.S.C. 103(a) as being unpatentable over Brent et al. (US 6,272,358 B1), hereinafter referred to as Brent, in view of Thornton et al. (US 6,363,065 B1), hereinafter referred to as Thornton.

Regarding claim 17 as explained above in the rejection statement of claim 12, Brent discloses all of the claim limitations of claim 12 (parent claim).

Brent does not disclose *gathering information on the at least one other network device and storing the information for future use in identifying the other network device as a packet device.*

Thornton teaches gateways, which inherently utilize a routing table that corresponds IP addresses to packet devices (See Figures 1 and 2.)

It would have been obvious to one of ordinary skill in the art at the time of the invention to implement the gateways of Thornton in the system of Brent. One ordinary skill in the art at the time of the invention would have been motivated to do so in order to interface multi-protocol networks in a seamless environment. An added benefit of doing so would allow for the integration of current and future technologies.

Regarding claim 18 as explained above in the rejection statement of claim 12, Brent discloses all of the claim limitations of claim 12 (parent claim).

Brent does not disclose *accessing a storage of known network devices based upon the identifying signals; locating information about the at least one other network device; and using that information in altering the communication session.*

Thornton teaches gateways, which inherently utilizes its internal routing table to correspond IP addresses to network devices in order to resolve IP destination addresses for communication IP based devices when routing data through the data network (See Figures 1 and 2.)

It would have been obvious to one of ordinary skill in the art at the time of the invention to implement the gateways of Thornton in the system of Brent. One ordinary skill in the art at the time of the invention would have been motivated to do so in order to interface multi-protocol networks in a seamless environment. An added benefit of doing so would allow for the integration of current and future technologies.

Response to Arguments

9. Applicant's arguments regarding claims 1-11 have been fully considered but they are not persuasive.

Rejection Under 35 USC § 102

On page 6, of the remarks, regarding claims 1-6 and 9-11 the Applicant argues Thornton does not disclose *a converter operable to receive a packet data stream to a public switched telephone data stream.* The Examiner respectfully disagrees. Thornton discloses a gateway will route the received packets through the PSTN or over the data network, converting the packets for transmission over the circuit switched network when the gateway determines that an auto-switch

between the networks is necessary (See column 39, lines 63-67.) Therefore, Thornton discloses *a converter operable to receive a packet data stream to a public switched telephone data stream.*

Rejection Under 35 USC § 103

On page 8 of the remarks, regarding claims 12, 13, 15, 16, and 19-21, the Applicant argues Brent does not disclose *establishing a communication session between a first packet device and other devices across a public switched telephone network by transmission of a public switched telephone network data stream through a public switched telephone network converter.* The Examiner respectfully disagrees. Brent teaches a mobile-to-mobile call connection is established across the public switched telephone network via the public switched data stream (See column 2, lines 19-33.) Therefore, Brent teaches *establishing a communication session between a first packet device and other devices across a public switched telephone network by transmission of a public switched telephone network data stream through a public switched telephone network converter.*

On page 9 of the remarks, regarding claims 17 and 18, the Applicant argues Thornton does not teach *accessing a storage of known network devices based upon the identifying signals; locating information about the at least one other network device; and using that information in altering the communication session.* The Examiner respectfully disagrees. Thornton teaches gateways, which inherently utilizes its internal routing table to correspond IP addresses to network devices in order to resolve IP destination addresses for communication IP based devices when routing data through the data network (See Figures 1 and 2.) Therefore, Thornton teaches *accessing a storage of known network devices based upon the identifying signals; locating*

information about the at least one other network device; and using that information in altering the communication session.

Conclusion

10. Applicant's amendment necessitated the new ground(s) of rejection presented in this Office action. Accordingly, **THIS ACTION IS MADE FINAL**. See MPEP § 706.07(a). Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

A shortened statutory period for reply to this final action is set to expire THREE MONTHS from the mailing date of this action. In the event a first reply is filed within TWO MONTHS of the mailing date of this final action and the advisory action is not mailed until after the end of the THREE-MONTH shortened statutory period, then the shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no event, however, will the statutory period for reply expire later than SIX MONTHS from the date of this final action.

11. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Donald L. Mills whose telephone number is 571-272-3094. The examiner can normally be reached on 8:00 AM to 4:30 PM.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Hassan Kizou can be reached on 571-272-3088. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see http://pair-direct.uspto.gov. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

Donald L Mills

December 20, 2005

HASSAN KIZOU
SUPERVISORY PATENT EXAMINER
TECHNOLOGY CENTER 2600